REMARKS/ARGUMENTS

The Examiner is thanked for the review of the application.

Claims 1-14, 18-23 remain in this application. Claims 1, 4, 5, 8, 11, 12, 18-20 have been amended. Claims 15-17 have been canceled without prejudice or disclaimer of the subject matter within. Claims 21-23 have been added. No new matter has been added.

In the Office Action dated August 1, 2005, the Examiner rejected Claims 1-8 and 15-20 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter stating that "Claims 1-8 and 15-20 appear to be describing a method that is attempting to sell a price management technique, whereas a group of stores are grouped based on current store/pricing information. Thus, this process does not include a distinguishable apparatus, computer implementation, or any other incorporated technology, and would appear to be an attempt to patent an abstract idea not a 'tangible' process and, therefore, non-statutory subject matter. As to technological arts recited in the preamble, mere recitation in the preamble (i.e. intended or field of use) or mere implication of employing a machine or article of manufacture to perform some or all of the recited steps does not confer statutory subject matter to an otherwise abstract idea unless there is positive recitation in the claim as a whole to breathe life and meaning into the preamble. Mere intended or nominal use of a component, albeit within the technological arts, does not confer statutory subject matter to an otherwise abstract idea if the component does not apply, involve, use, or advance the underlying process."

Independent method Claim 1 has been amended to recite "re-optimizing prices for the plurality of products for at least one of the plurality of store clusters, wherein the re-optimizing of prices uses demand coefficients, cost coefficients and optimization rules, and wherein the re-optimizing of prices is implemented on a computer" (emphasis added) and hence is now compliant with 35 USC 101. Method Claims 2-7, 18-20 all depend on Claim 1 and are also compliant with 35 USC 101 for at least the same reasons.

In the same Office Action the Examiner has also rejected Claims 1-20 under 35 U.S.C. 103(a) as being unpatentable over Woo et al. (US 6,910,017 B1).

Regarding Claims 1 and 8 the Examiner has stated that "Woo discloses a computer-implemented method (apparatus) for forming a plurality of stores into a plurality of clusters (location hierarchy) comprising: collecting a store specific information; providing optimized combinations for each individual store based on the store specific information (C3 L64-67, C4 L1-47); and optimized prices for a plurality of products for at least one of the plurality of clusters, and wherein the optimizing of process uses demand coefficients, cost coefficients and optimization rules (C2 L53-67, C3 L1-63, Claim 2). Woo fails to expressly disclose 'creating a plurality of clusters based on the closeness of the optimal combinations.' However, Woo does disclose aggregating historical data into item classes and subclasses in accordance with an item hierarchy – to include location hierarchy (C3 L64-67, C4 L1-47). Woo also discloses using the historical information (including demand and cost of sales information) to determine optimal pricing information (C2 L53-67, C3 L1-63, Claim 2). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to have included creating a plurality of clusters based on the closeness of the optimal combinations (locations), as the same information is collected and analyzed by the system/method disclosed by Woo, and would be simply integrated into any price management system."

Amended base Claims 1, 8 now recite "providing optimized combinations including optimized prices for a plurality of products for each individual store of the plurality of stores based on the store specific information ...creating a plurality of store clusters from the plurality of stores based on the closeness of the optimal combinations; ... re-optimizing prices for the plurality of products for at least one of the plurality of store clusters" (emphasis added).

Support for the two-stage price optimization (an initial price optimization stage used for forming the store clusters, and re-optimization stage to optimizing prices for each of the store clusters), can be found in Applicants' Figures 1, 2 and specification on page 5, line 9 to page 6, line 4. For example, "an optimization is performed using the point-of-sales and cost data (step 104). Preferably, the same optimization is performed for all stores. FIG. 2 is a schematic view of a price optimization system 200, which may be used to provide a price optimization" (see

page 5, lines 12-15 of specification). In step 108 of Figure 2, clusters are then created based on the initial optimization step.

Further support for Claims 1, 8 can be found on page 13, line 11 to page 14, line 15 of Applicants' specification and on Figure 6. "An optimization engine as described above may be used to determine the most profitable combination of products for each store" (page 13, lines 14-16). "Using the above example of soap products, an optimization may be performed using the store specific data to determine combinations of 200 products of the 500 products that would optimize sales ... for each of the 100 stores (step 604)" (page 13, line 22 to page 14, line 2).

In contrast, Woo '017 teaches the use of hierarchies for forming store clusters, the hierarchies being based on items, time periods, locations, and combinations of (Col. 4, lines 25-47). Woo '017 does not disclose nor suggest a first price optimization for forming store clusters, followed by a second price optimization within each store cluster. Hence, independent Claims 1, 8 are allowable over the cited reference(s).

Regarding Claims 2 and 9 the Examiner has stated that "Woo discloses providing cluster based combinations (location hierarchy)."Regarding Claims 3 and 10, the Examiner has stated that "Woo discloses wherein the store specific information is selected from a group comprising point-of-sales data, customer survey data, and cost data." Regarding Claims 4 and 11, the Examiner has stated that "Woo discloses wherein the combinations are selected from a group comprising item and price, assortment, and promotion combinations."

Regarding Claims 5 and 12, the Examiner has stated that "Woo discloses wherein creating the plurality of clusters, comprises: providing at least one constraint; and placing stores that meet the constraints and with the closest optimal combinations in the same cluster of the plurality of clusters (common practice in cluster pricing/price management)." Regarding Claims 6 and 13, the Examiner has stated that "Woo discloses wherein the at least one constraint places two stores in the same cluster, by making each store of the two stores have the same optimal combination (common practice in cluster pricing/price management)." Regarding Claims 7 and 14, the Examiner has stated that "Woo discloses wherein the at least one constraint specifies a maximum number of clusters (common practice in cluster pricing/price management."

Dependent Claims 2-7 and 9-14 depend on Claims 1 and 8, respectively, are all allowable for at least the same reason Claims 1 and 8 are allowable over the cited reference(s).

Regarding Claim 18, the Examiner has stated that "Woo discloses wherein the at least one constraint prohibits two stores of the plurality of stores from being in the same cluster (common practice in cluster pricing/price management)." Regarding Claim 19, the Examiner has stated that "Woo discloses wherein the at least one constraint places two stores in the same cluster, by averaging the prices of an item and placing the average price as the price of the item in each store (common practice in cluster pricing/price management)." Regarding Claim 20, the Examiner has stated that "Woo discloses wherein the at least one constraint places stores with geographical closeness in the same cluster (common practice in cluster pricing/price management)."

Amended dependent method Claims 18-20 and new dependent apparatus Claims 21-23 all depend on Claims 1 and 8, respectively, and are also allowable for at least the same reasons base Claims 1, 8 are allowable.

In sum, base claims 1, 8 have been amended and are now believed to be allowable. Dependent claims 4, 5, 11, 12, 18-20 have been amended and are now believed to be allowable. Dependent claims 2-7, 9-14, 18-23 which depend therefrom are also believed to be allowable as being dependent from their respective patentable parent claims 1, 8 for at least the same reasons. Hence, Examiner's rejection of dependent Claims 2-7, 9-14, 18-20 are rendered moot in view of the amendment to independent Claims 1, 8. New claims 21-23 have been added and are also believed to be allowable. Claims 15-17 have been canceled without prejudice or disclaimer of the subject matter therein.

Applicants believe that all pending claims 1-14, 18-23 are now allowable over the cited art and are also in allowable form and respectfully request a Notice of Allowance for this application from the Examiner. Applicants also enclose our Credit Card Payment Form authorizing the amount of $910.00 to cover the RCE fee and extension of time fee. The commissioner is authorized to charge any additional fees that may be due to our Deposit Account No. 50-2766 (Order No. DEM1P010). Should the Examiner believe that a telephone conference would expedite the prosecution of this application, the undersigned can be reached at telephone number 925-570-8198.

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Respectfully submitted,

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